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Connor James Spratt SCHOOL OF PHILOSOPHY, PSYCHOLOGY AND LANGUAGE SCIENCES, UNIVERSITY OF EDINBURGH, UK

Liam Alexander MacKenzie Myles

DEPARTMENT OF PSYCHOLOGY, UNIVERSITY OF CAMBRIDGE, UK

Emanuele Maria Merlo

DEPARTMENT OF ADULT AND CHILDHOOD HUMAN PATHOLOGY, UNIVERSITY OF MESSINA, MESSINA, ITALY, emerlo@unime.it

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Eating Disorders in Men: A Comprehensive Summary

Connor James Spratt¹, Liam Alexander MacKenzie Myles², Emanuele Maria Merlo^{3*}

¹SCHOOL OF PHILOSOPHY, PSYCHOLOGY AND LANGUAGE SCIENCES, UNIVERSITY OF EDINBURGH, UK

ABSTRACT

Eating disorders (EDs) have detrimental effects on an individual's physical and mental health, along with significant interpersonal, social and economic effects. Furthermore, men who are suffering with an ED face unique challenges with this. Men suffering with EDs have historically received little attention within ED research, diagnosis and intervention. However, the number of men suffering with these issues is significant and growing. Understanding of EDs tend to ignore male experiences, meaning many are left to suffer in silence until the ED has developed to a critical point. However, many now recognize the need to understand the issues facing men suffering with an ED. By improving our understanding, we can better improve early detection, diagnosis and treatment for those who are suffering. This paper aims to provide a comprehensive general introduction to this growing area of research and it is hoped that it will be of good use to interested researchers, students and the general public. Prevalence, presentation, history, diagnosis and more will be covered in order to provide a well-rounded understanding of EDs in men.



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*Corresponding author:

Emanuele Maria Merlo,

Department of Adult and Childhood Human Pathology, University of Messina, Messina, Italy

E-mail: emerlo@unime.it

Introduction

Eating disorders (EDs) are a group of psychiatric conditions characterized by a disturbance and significantly impairing distress around food and related issues [1]. This paper will discuss the history, current diagnosis, etiological factors and treatment of EDs by examining a range of eating disorders. Specifically, this article will focus on men with EDs.

The true prevalence of EDs is unclear, as only a minority of those with an ED undergo treatment whilst many go undetected until symptoms become potentially fatal [2-5]. Leading UK ED charity 'BEAT' estimate that around 1.25 million people in the UK suffer from EDs, although some studies indicate this number is closer to 2 million [6,7]. Eating disorders can have serious consequences, including increased risk of comorbidity, and entail one of the highest mortality rates of any psychiatric condition [8-15]. Typical age of onset varies amongst EDs, although research suggests a range of around 10 years old to later adolescence [16-19]. Eating disorders also cause serious economic damage through lost income, treatment

costs, reduced quality of life and much more, reaching around £9.6 billion per year [7].

As highlighted in a recent review by the Scottish government into ED conceptualization, treatment and research, men are being failed by the current healthcare system [6]. To explore how, why and the consequences of this, this paper will focus on this demographic population.

Discussion

Men and Eating Disorders

When it comes to EDs, men are "underdiagnosed, undertreated and misunderstood" [20]. Statistics vary for how many men are affected by EDs, ranging from 10%-25% of all ED instances, although this is likely much higher [21,22]. Research and understanding of EDs have largely ignored male experiences [21]. Less than 1% of ED research includes men, with some research even excluding men for representing an 'atypical' population [23]. This has further pushed the stereotype that EDs are a 'female only' issue affecting young, emaciated women, despite research persistently showing that men do not typically express ED symptomology in similar ways to women

²Department of Psychology, University of Cambridge, UK

³DEPARTMENT OF ADULT AND CHILDHOOD HUMAN PATHOLOGY, UNIVERSITY OF MESSINA, MESSINA, ITALY

[20,23]. This stigma that EDs only affect women leads men to believe that they are not suffering and causes a delay in seeking help [24]. Even those that do seek help face increased risk of not being diagnosed, due to social misunderstanding of EDs, clinical misunderstanding of EDs, a lack of research and more [21,25]. Early intervention is key to overcoming EDs, although our lack of understanding of EDs experienced by males makes this increasingly difficult [26]. To improve outcomes for men with an ED, it is crucial to understand how men experience EDs.

Presentation of ED

The transdiagnostic model of EDs highlights that all EDs share core issues and mechanisms, namely an overevaluation of weight which leads to attempts to control this [27]. However, the way these core issues are expressed differs significantly across gender. For instance, males suffering with an ED are more likely to over-exercise but less likely to abuse of laxatives for weight loss [28]. Furthermore, men are more likely to have a desire to gain more muscle and lose fat [29]. This concern for one's appearance can also lead to increased substance abuse, binge drinking and depressive symptoms Additionally, the drive for muscularity also leads to very rigid behaviors, such as restriction of low-protein foods, prioritizing eating more meals over other important tasks, eating beyond feeling full and so on [31]. Importantly, this is not an exhaustive list of behaviors observed in men with EDs and research suggests an underlying pattern in that men are typically secretive with these symptoms, usually due to the stigma of being a male with a 'female' issue [24,32]. Sadly, this has been observed to cause delayed help-seeking in qualitative research [25].

As well as this secrecy, many of the disordered behaviors presented by men will not be identified on widely used diagnostic tools [33]. This could underpin research that suggests that men are less likely to receive a diagnosis, as they are not being identified by traditional diagnostic tools [34,35]. One key factor in this issue is how we have historically conceptualized EDs [36].

History of Diagnosis

Although first non-medical descriptions of EDs included men as well as women, male experiences have since been largely ignored in diagnosis [36,37]. The first eating disorder to be included as part of the DSM was Anorexia Nervosa (AN). Diagnostically defined in 1952, AN is characterized by a pathological focus on thinness, an extreme fear of weight gain and being significantly underweight [38]. On top of this, the loss of one's period, amenorrhea, was included as one of the essential criteria for diagnosis of an ED. As this was the only defined ED, this inferred that eating disorders can only be experienced once one has lost their periods, which cannot apply to most males.

The effect of this was indescribably influential as seen in the second formally diagnosed eating disorder, Bulimia Nervosa (BN) [39]. Bulimia Nervosa is characterized by persistent food restriction, followed by uncontrollable binge episodes of food and subsequent purgatory or compensatory behavior. This was originally described as a 'failed anorexia' as it was initially observed in underweight females who were underweight but also experienced uncontrollable binge episodes [32,40].

Current Diagnosis

After this second diagnosis of BN, there were no significant changes to our diagnostic systems until 2013. Before the DSM-V, only AN, BN and Eating Disorder Not Otherwise Specified (EDNOS) were the individually defined eating disorders. This excluded typical male experience of EDs, as diagnosis was either predicated on losing weight, or it was placed in a residual category with no real description. This most likely explains why EDNOS was the most prevalent eating disorder for men, as it particularly affects under-researched populations whilst AN and BN did not capture male experiences of these issues [41].

Thankfully, the most recent editions of the DSM-V have made efforts to change these issues within current diagnosis for men. Namely, amenorrhea has been taken out of the DSM essential criteria for anorexia [1]. Additionally, the criteria for BN were loosened to meet the experiences of men who do not show as high a rate of objective bingeing episodes [21]. On top of these changes, new diagnoses were included to incorporate more male experiences of EDs into diagnosis. For instance, Binge Eating Disorder (BED) was included as an individual condition in DSM-V. BED is characterized by uncontrollable binge episodes and associated feelings of extreme guilt [1]. Differing from BN, this is typically not followed by purging. This diagnostic criterion seems to better capture male experiences, as men account for a higher number of BED cases than they do AN or BN cases [21]. Current diagnostic criteria also seem to reduce the rates of EDNOS compared to previous systems [42]. Although this would be a strong indicator that this current system has better accounted for male experiences, this was only seen in female only participants and males still show high rates of EDNOS [43].

Etiological Factors

Eating disorders are a complex problem with many different factors that are biological, psychological and social in nature [44-46]. However, this paper will take a psychosocial approach to discussing etiological factors, as there is little research investigating the biological factors affecting eating disorders in men and a psychosocial approach highlights areas that can be actively address through treatment.

Social factors such as increased pressure for men to build muscle and lose fat are shown to increase body satisfaction, a major risk factor in developing ED [47,48]. For instance, in a study involving 698 young male athletes, pressure to lose weight and be muscular for their relevant sport was significantly associated with symptomology [47]. For these athletes, this resulted in disordered eating symptoms such as increased calorie restriction, guilt around missing exercise and so on. Sadly, this pressure is all-encompassing within the life of males, as evidenced by the Tripartite model of social influence [49]. This model shows that the media, peers and parents are instrumental when it comes to increasing pressure to be muscular. Although this model was originally based on girls and women, it has since been refined to explore the issues faced by men [50]. For example, research has shown evidence that mothers encouraging their children to "be bigger" can cause body image disturbances in 3- to 6-yearold boys [51]. This pressure has also been observed crossculturally within non-white populations, which is important to note as ED research rarely explores non-white populations [52].

Although this social influence is significant for men, not all are affected to the extent of developing an ED. As emphasized in the tripartite model, there must be mediating factors between the social pressure and developing an ED [53]. One of the key meditating variables for this are psychological factors, such as body image. Body image is our "inside view" of the body, encompassing our attitudes, beliefs and feelings towards how we look [54]. A recent survey of 4505 UK adults and 1118 13-year-olds showed that 25% of young boys worried 'often' or 'always' about their body image; 25% of men felt shame from their body image [55]. Sadly, boys as young as six years old already express body dissatisfaction for not having enough muscle [56]. Research has shown that male body dissatisfaction is associated with an increase in ED symptomology [57]. Furthermore, those pursuing a muscular ideal due to this body dissatisfaction have similar levels of pathological eating to those with AN [58]. Due to the clear prevalence of body image problems for men and boys in the UK and its associated outcomes, this is a vital area to understand when considering why men develop EDs. Unfortunately, common ED diagnosis tools do not include concerns with muscularity which particularly affects men [48].

Treatment

CBT enhanced for EDs (CBT-E) has been shown to be an effective treatment for EDs across diagnoses [27,59]. CBT-E is focused on achieving a meaningful, lasting remission of symptoms through focusing on pathological eating behaviors, as well as the underlying mechanisms that maintain this [59-61]. Underlying mechanisms of psychological difficulties such as EDs include clinical perfectionism, low self-esteem [62-64], capability to cope

with difficult and intense adverse moods, and interpersonal skills. The specific ED is irrelevant to treatment, as the focus is on mechanisms that underlie all EDs. The majority of participants receive 20 sessions, or 40 if significantly underweight. The treatment is further characterized by an initial intense stage, lasting around four weeks, which is focused on education around the disorder and how the individual formulates their issue. This is then followed by an assessment of the progress made after the initial stage, along with identifying any obstacles to advancement. After this assessment, the third stage is focused on adapting to the individual's difficulties, such as specific eating behaviors, to address the most relevant underlying mechanisms. The final stage is focused on ensuring the changes made are upheld.

This treatment shows promise with male populations, particularly with the education around eating EDs. Many men will come to treatment with expectations of eating disorders being a 'female' issue and thus may not engage as much if this is not addressed properly [25,34]. Furthermore, clinicians must ensure to avoid using language that further stigmatizes the patients view, such as a focus on thinness which isn't frequently observed within men [65].

On the other hand, younger men, where ED symptoms usually start, are usually less able to articulate their thoughts about their body and potentially disordered behaviors [65]. Thankfully, CBT-E has been shown to be useful in younger adolescent populations even if these populations may have difficulty articulating cognitions that may be perpetuating distress [66-68]. Although promising, these studies have predominantly been conducted with female participants. To further show the efficacy of this treatment, research must be extended male experiences of this treatment.

Conclusions

EDs affecting men are underexplored. Sadly, this has led to reduced chances of effective diagnosis, poor treatment outcomes and further complications with these issues. Although psychologists have made great progress over recent years, there are areas needing further research, as highlighted in this paper. Without this, men with EDs are being failed.

Conflict of interest disclosure

There are no known conflicts of interest in the publication of this article. The manuscript was read and approved by all authors.

Compliance with ethical standards

Any aspect of the work covered in this manuscript has been conducted with the ethical approval of all relevant bodies acknowledged within the manuscript.

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